TITAN
CONSULTING

Rapid
AppWerks

Mendix

Low code
for the Enterprise

Titan Consulting / Rapid App Werks

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TITAN
CONSULTING

Established in 2001 by former SAP Executives, providing services to a customer base over 15 years of services and project implementations. Our SAP on-shore resources average over 20 years of experience across the SAP suite of solutions.

SAP Expertise covering the full lifecycle of managing enterprise applications

- New Projects
- Technical and Functional Upgrades
- Staff Augmentation
- Fractional Consulting
- Off-Shore/Near-Shore Development
- Application Managed Services (AMS)
- Fiori and Mobility Development

SAP Partner™

A Certified Partner

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What we'll cover today

01

Introduction of Titan Consulting/RapidAppWerks

02

What is Mendix

03

Modernize SAP with Mendix

04

Deployment Options

05

SAP/MX Use Cases

06

Questions

TITAN CONSULTING

Rapid AppWerks

Mendix is the leading low-code platform for enterprise to create, integrate, deploy, manage and iterate modern business applications at scale.

Visual modeling of logic, data, and UX

230,000+ Developers

140+ Universities
9,000+ Students

Large, established ecosystem of Mendix developers

Gartner

Leader

FORRESTER®

Recognized Leader by analysts

Deloitte.

SAP

Capgemini

Tencent

200+ Strategic Partnerships

SIEMENS

4.6B R&D Budget

3,600+ Patents

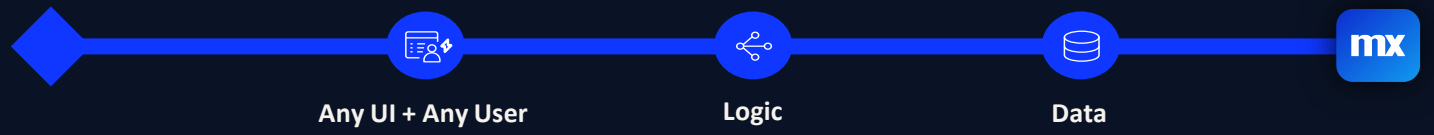
5,000 Partners

Strengthened by Siemens

© Mendix

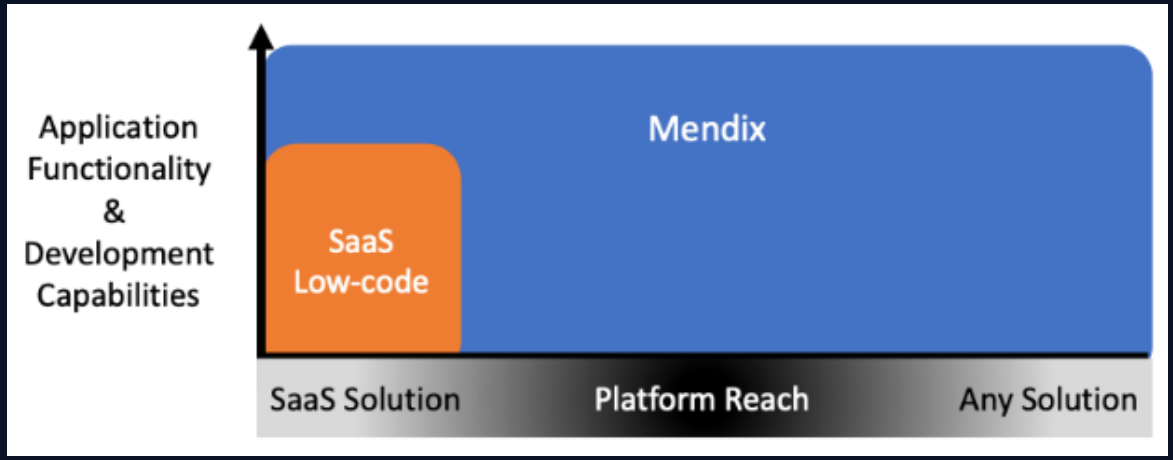
The Landscape

Developing in Mendix for any user, for a wide variety of interfaces, with complex logic, and a data layer.



Low code as a **Feature**

Low code as a **Platform** (LCAP)



What you can do with Mendix

Digitalize customer experiences

- SaaS applications
- Onboarding
- B2C mobile app
- Self-service portals

> “From idea to workable product that you can demonstrate to a customer in a fortnight, is unheard of. And we can do that.”
>
> **BARRINGTON CLARKE / DEVOPS LEAD / ZURICH INSURANCE**

Automate business processes

- Complex budget approvals
- Incident Management
- Plant maintenance
- Logistics/shipping management

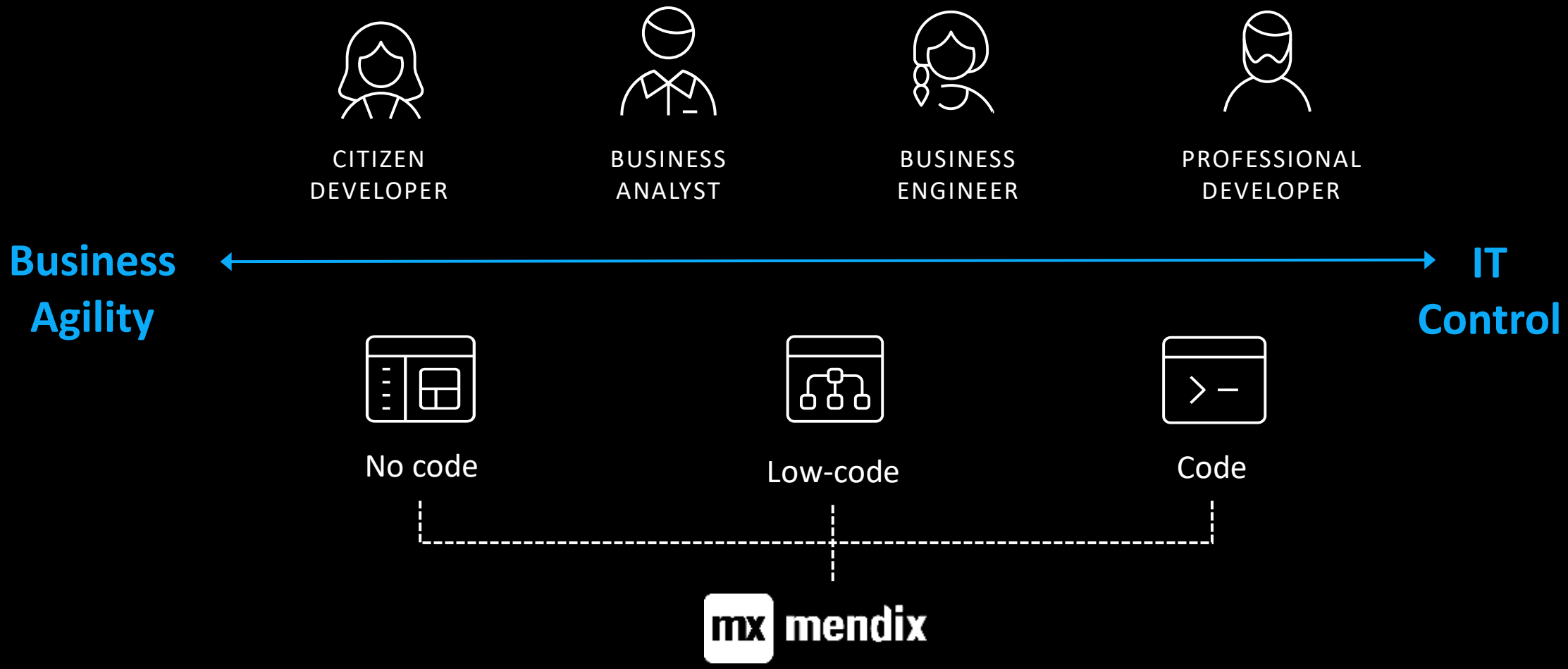
> “The services that we have built using Mendix have already processed millions of transactions per month.”
>
> **PRAKASH INBASEKARAN / ENTERPRISE ARCHITECT / DUBAI MUNICIPALITY**

Modernize core systems

- Mobile SAP Supply Chain
- Smart Warehousing
- Work order management
- Lotus notes refresh

> “Our 20-year old e-commerce solution had grown into a sizable monolith. To build a better application we needed better technology, so we brought Mendix in, which was fantastic for this kind of decomposition.”
>
> **MIROSLAV SAMOILENKO / DIRECTOR INTEGRATIONS ARCHITECTURE / TRANE**

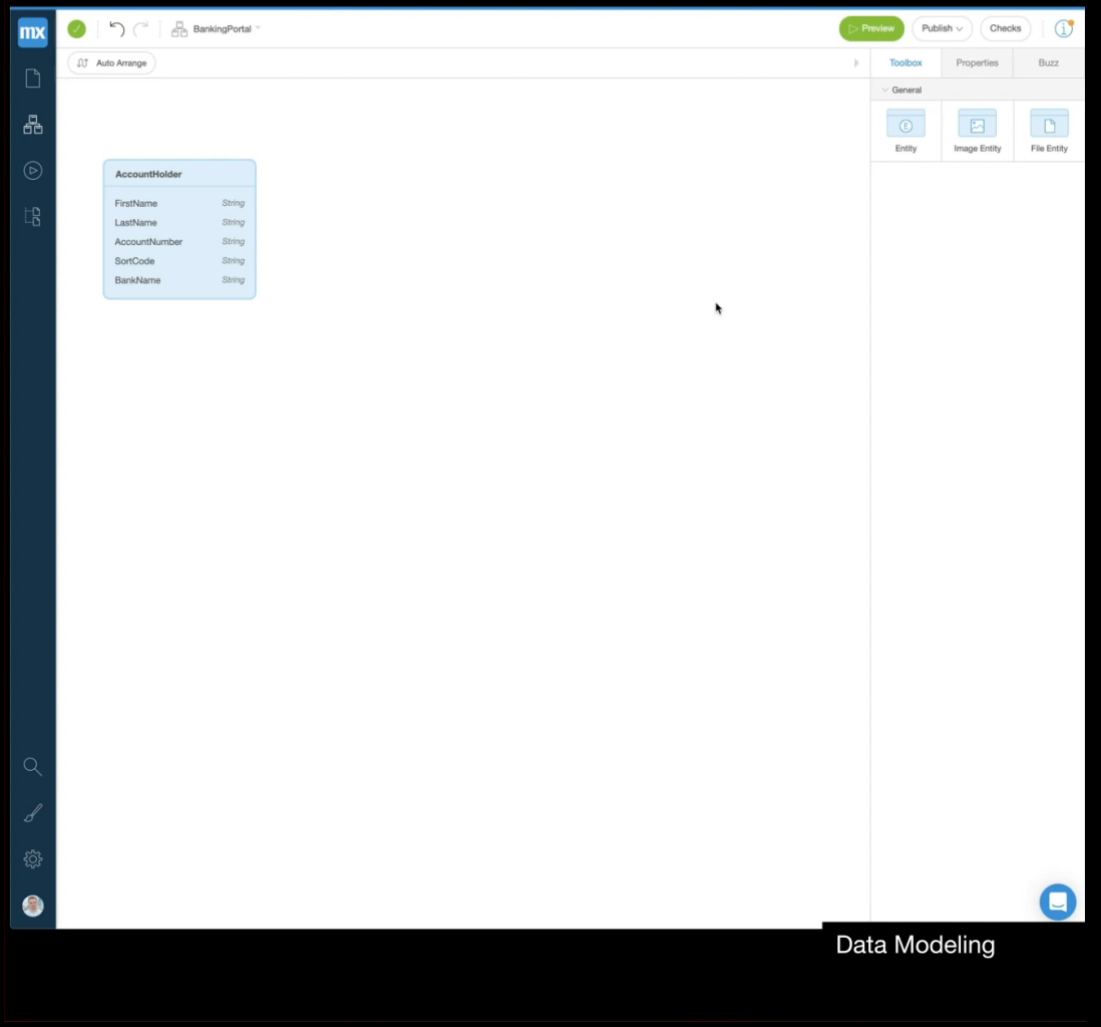
The Mendix way



Low / No Code Development

BUILD APPLICATIONS 5-10X FASTER WITH 70% LESS RESOURCES

- Purpose built IDEs **designed for** Citizen and Pro Developers to work seamlessly together on a single app model
- Create engaging user experiences across any device with Visual, drag-and-drop, WYSIWYG IDE's
- Visually model logic with **Microflows** for complex logic, business processes and workflow with AI assisted development
- Collaborate with stakeholders across the entire platform
  - Share and comment of screens and logic
  - Pair program across the globe
  - Keep stakeholders informed and updated
  - Define and curate requirements
- Rapidly iterate with built in feedback, support for continuous integration development & deployment



Data Modeling

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Deployment

Hybrid Cloud

- Leverage existing investment
- 1-click deployment
- Choose where each app is deployed
- Mendix apps in your own cluster for compliance, security or private connectivity needs - without managing your own CICD

Mendix Cloud

- Everything to host your Mendix apps at cloud scale. No DevOps team needed.
- Most optimized to run Mendix applications
- 1-click deployment
- Built in security and governance framework

On-premises

- Utilize existing infrastructure
- Migrate when ready, without rearchitecting
- Completely isolated from Mendix infrastructure. Complete control over deploying and managing your Mendix apps your way.

Multi-Cloud Portability

Build once, deploy anywhere

- Cloud portable out of the box
- Leverage existing investment
- (Virtual) Private Cloud or On-Premises

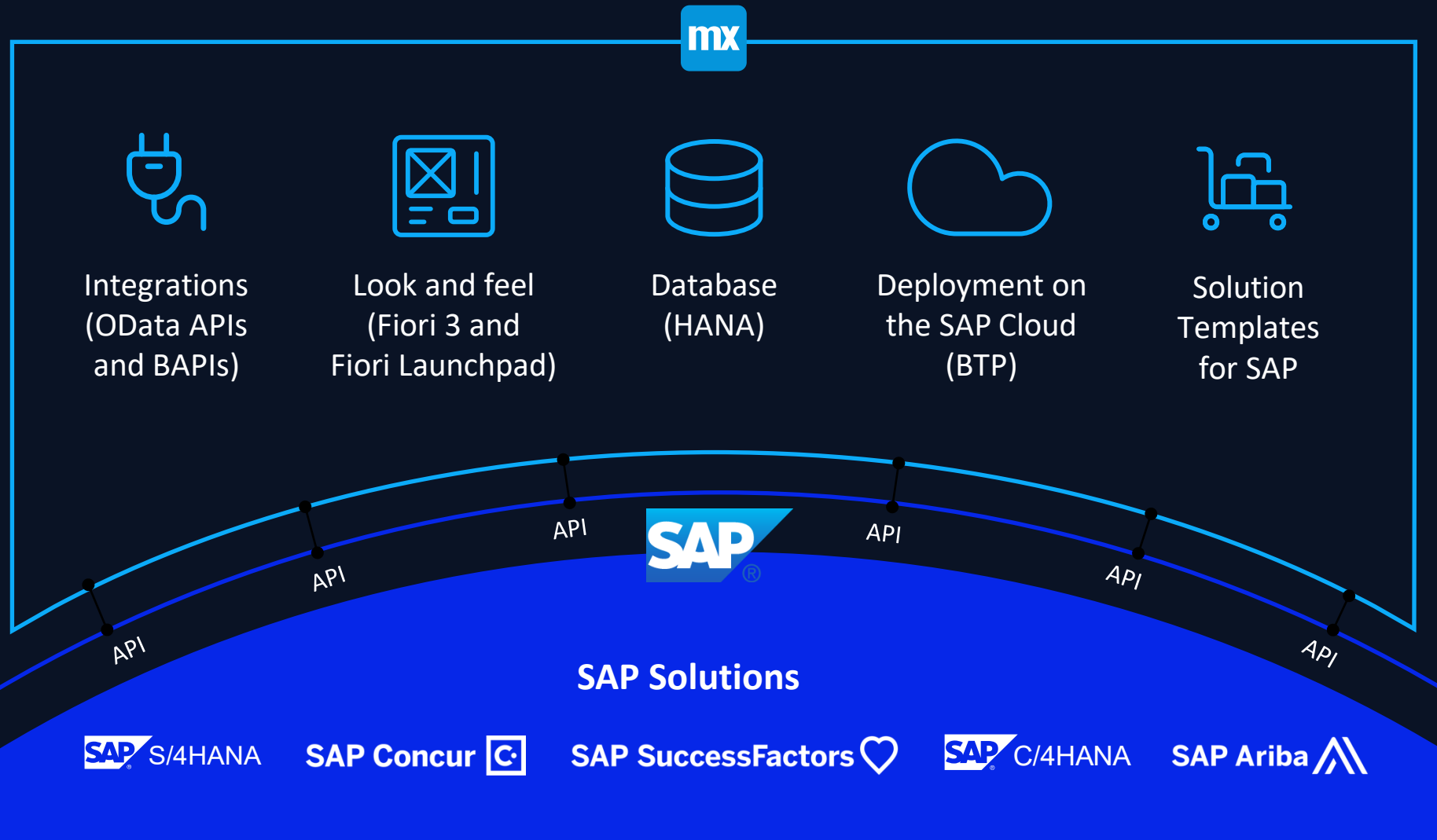
Future proof deployment strategy

- Deploy where you need to today
- Migrate without expensive re-architecting

Extend & Differentiate the Core with SAP Cloud Platform RAD by Mendix

- Build applications the business needs 10x faster
- Keep the core “vanilla” with future proof extensions
- Leverage out-of-the box integrations with SAP ERP and LoB applications

Run SAP even better with SAP Rapid Application Development by Mendix



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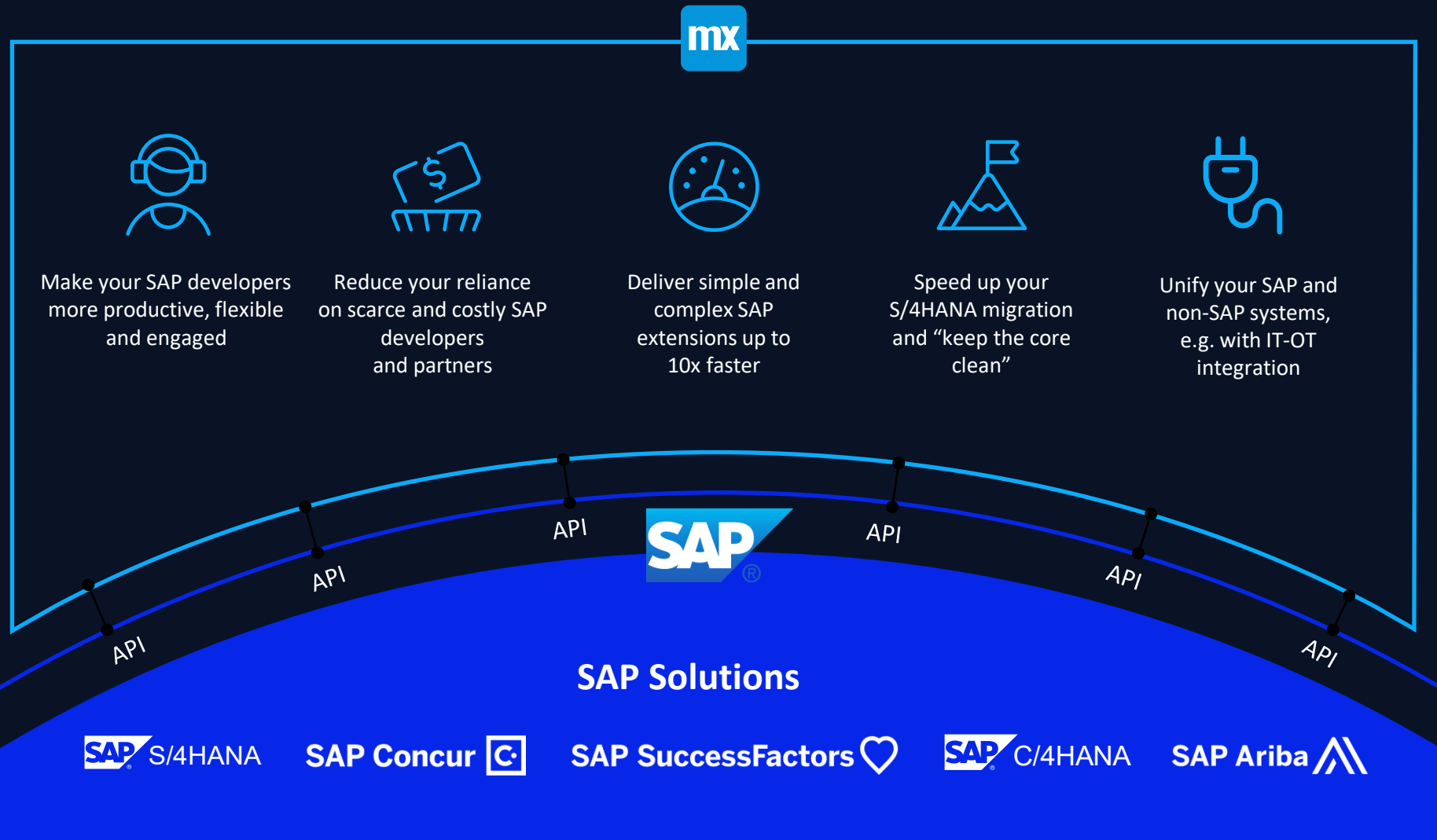
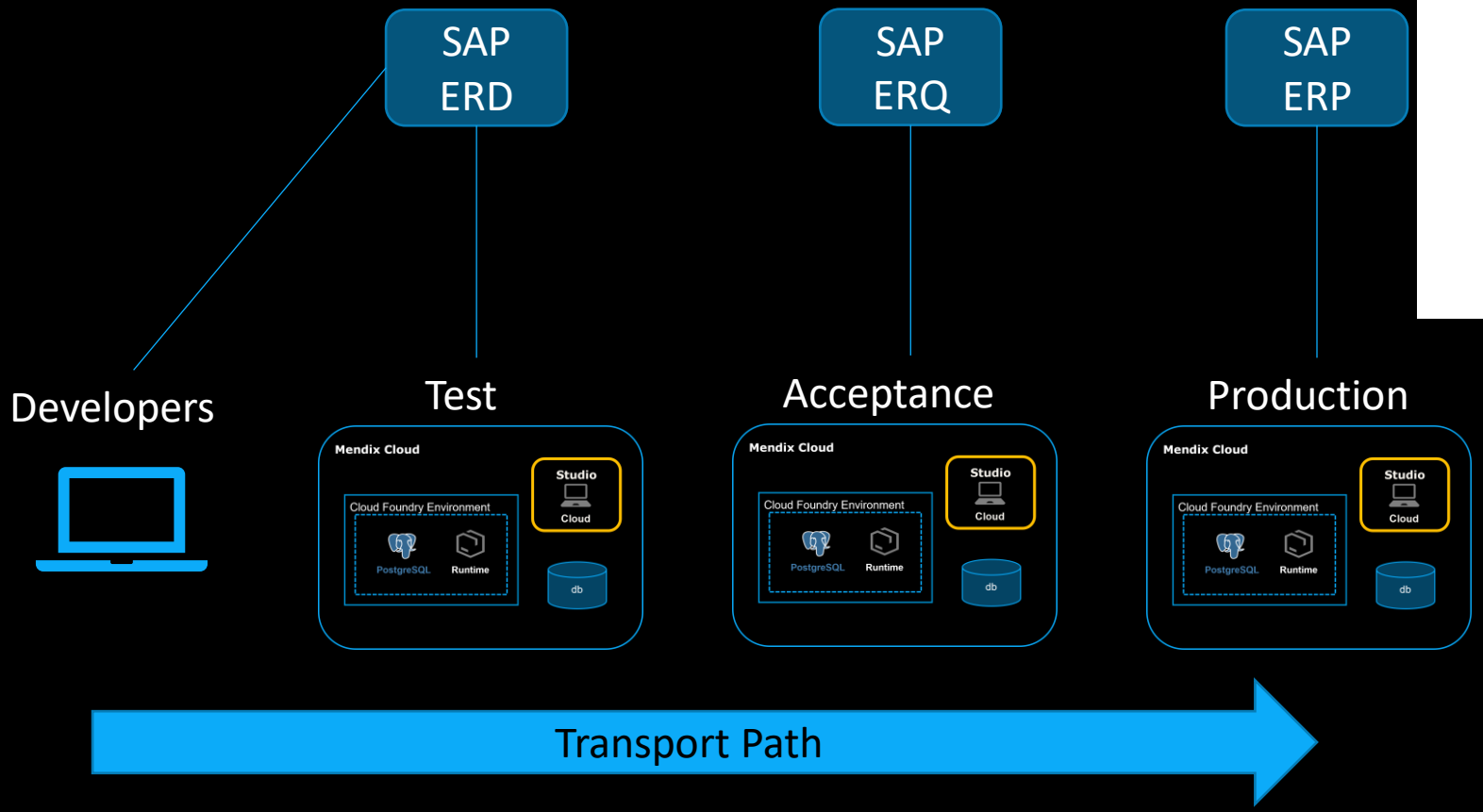
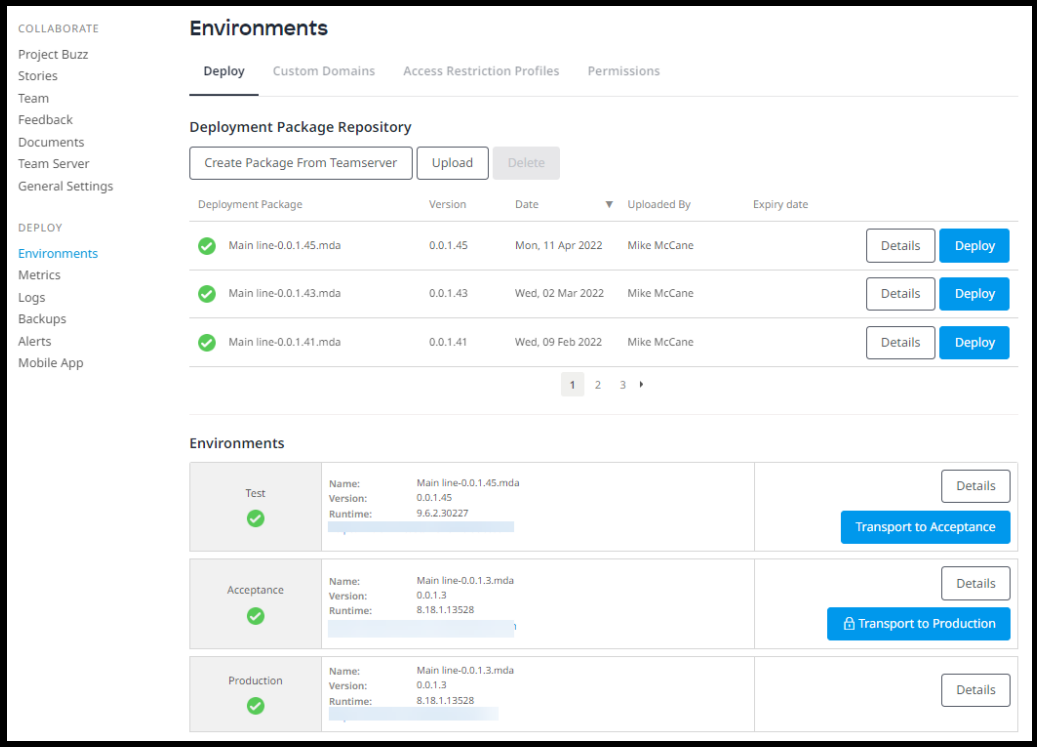


Mendix and SAP Landscape





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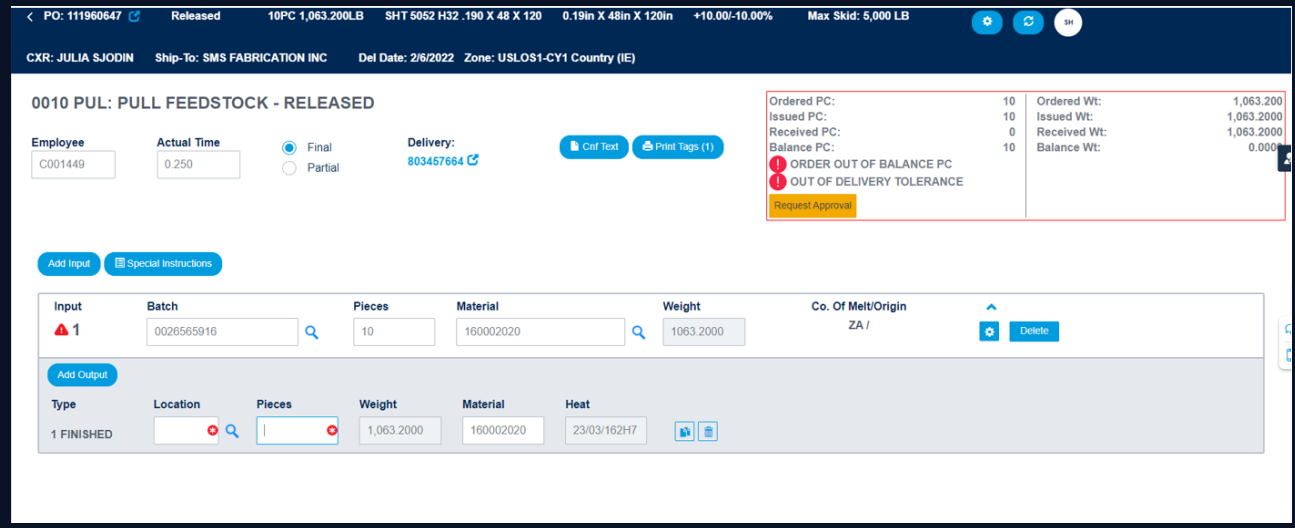
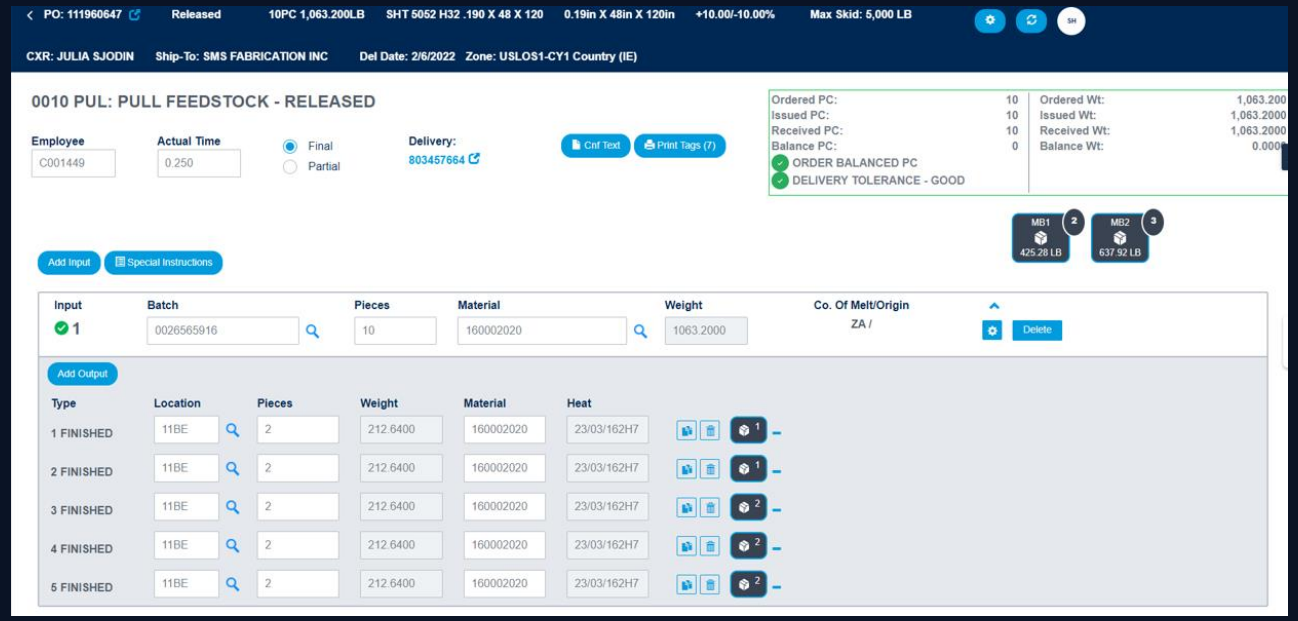
Rapid AppWerks

Use Cases

Production Order Processing - SAP

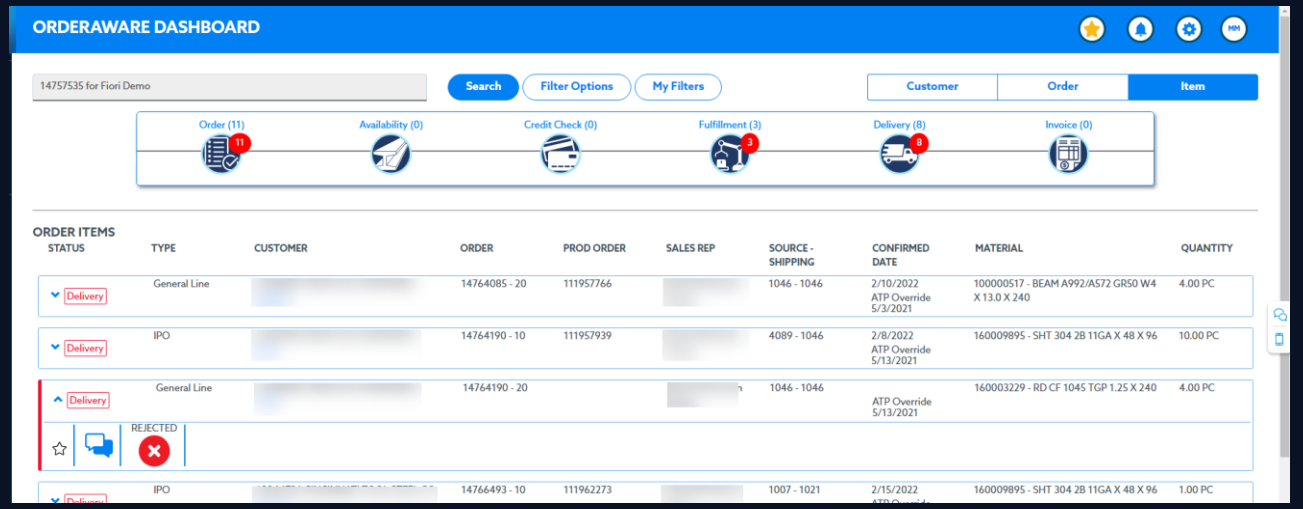
- Simplified and streamlined Production Order Confirmation processing for operators at manufacturing plants.
- Combines several complex production order confirmation steps into a single pane of glass for users, reducing complexity, entry time, and training time for new users.
- Modern design that shows only the most essential information and uses clear visual indicators to guide the user through data entry while highlighting problems during entry.
- Integration with SAP for all data across several transactions (Sales, Deliveries, Shipments, Production Orders, Purchase Orders, Batch Management, Master Data)
- Workflow for Supervisor Approval
- Navigation direct from Mendix to SAP via SlipStream

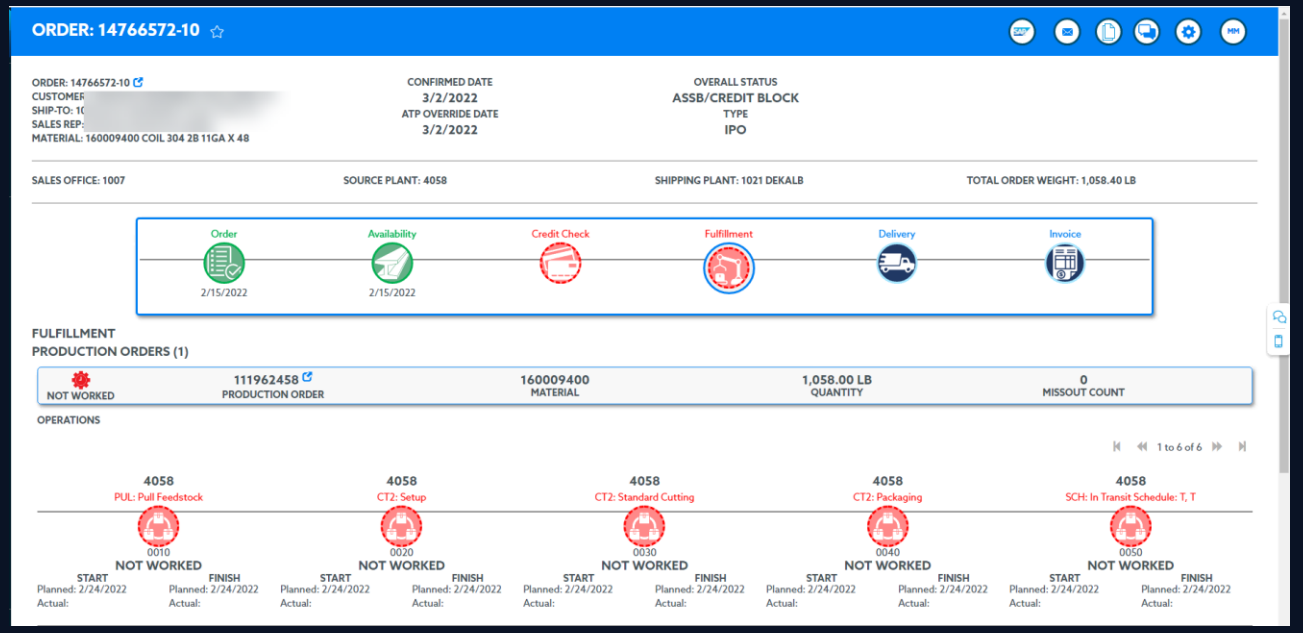




Sales Order Tracking and Visibility - SAP

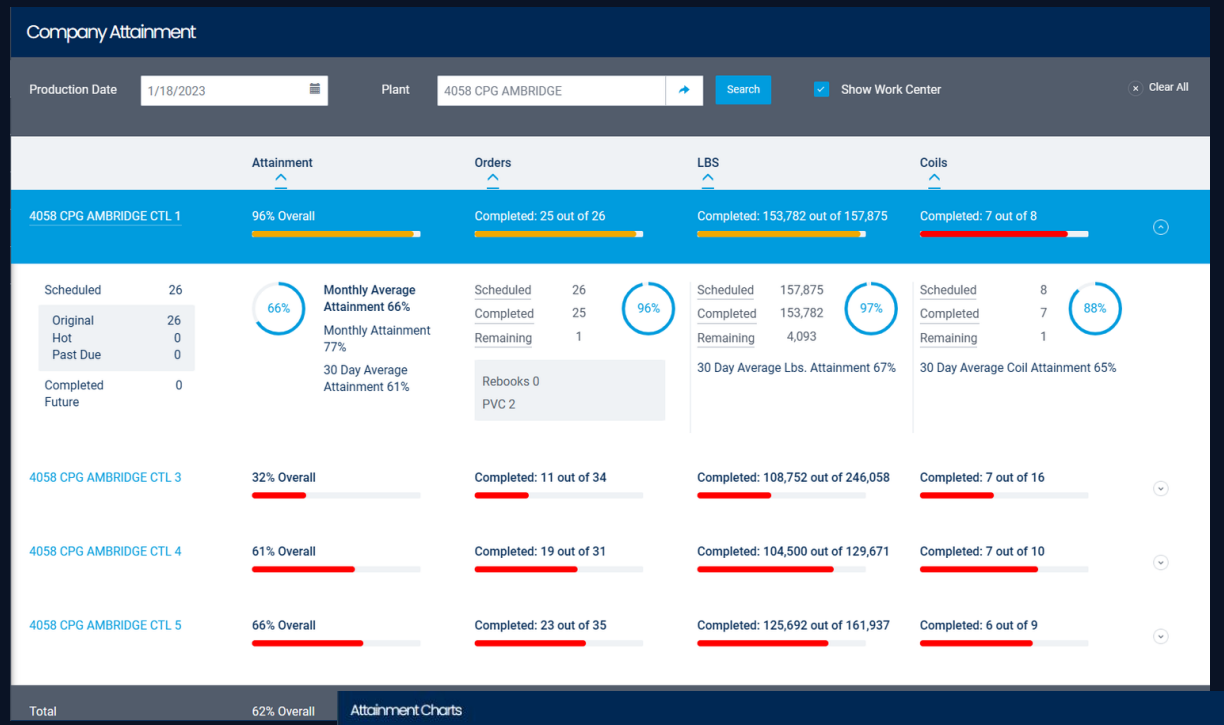
- Sales tracking application providing Sales, Manufacturing, Supply Chain and Customer Service with full visibility in order processing
- Combines several SAP transactions into a single pane of glass for users, reducing complexity and increasing time to service
- Notifications and alerting to provide users with exception-based capability to resolve issues
- Ability to comment and notify users of issues
- Integration with SAP for all data across several transactions (Sales, Production Orders, Inventory, Purchases, Credit..)
- Navigation direct from Mendix to SAP via SlipStream

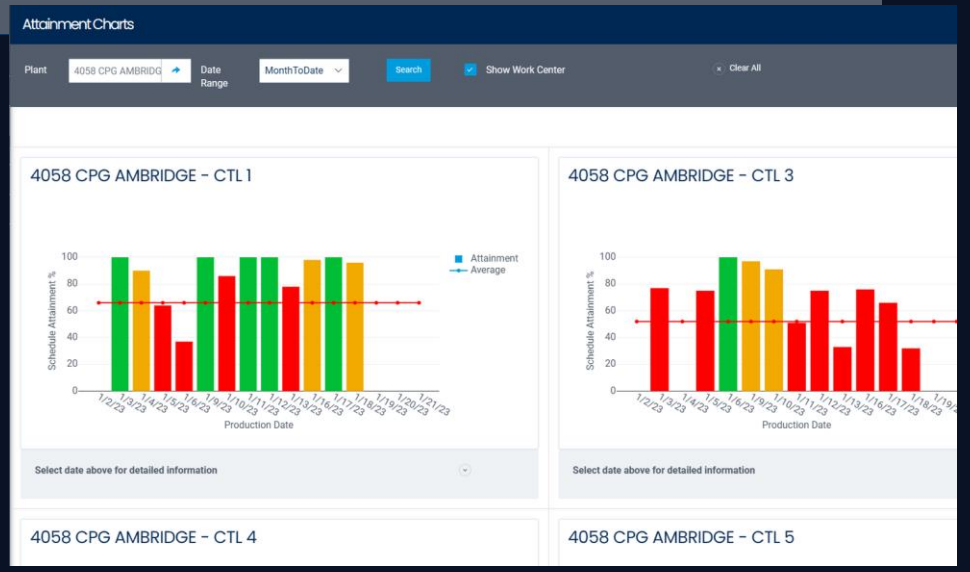




Schedule Visibility - SAP

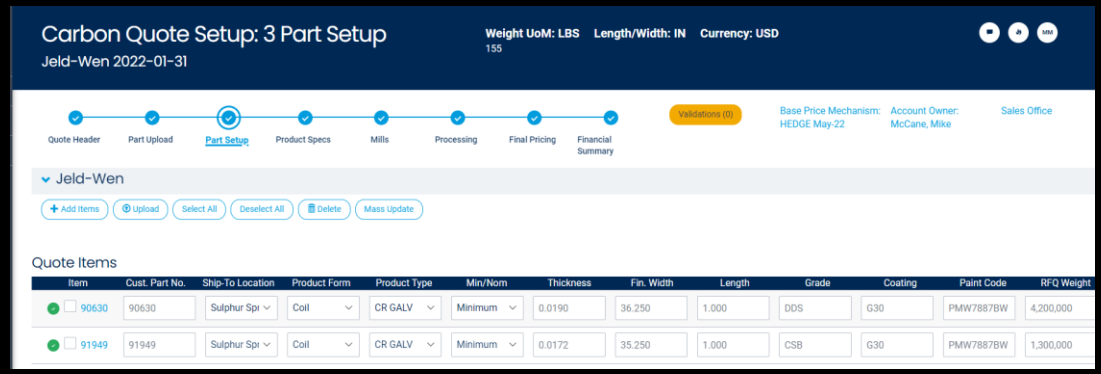
- Simplified and streamlined Production Order schedule visibility for Operators, Supervisors and Production Schedulers at manufacturing plants.
- Modern design that shows streamlined scheduling and manufacturing performance metrics
- Combines several SAP transactions into a single pain of glass for users, reducing complexity and increasing time to service
- Notifications and alerting to provide users with exception-based capability to resolve Scheduling issues
- Plant Operations Reporting to view scheduling conflicts/Order Issues

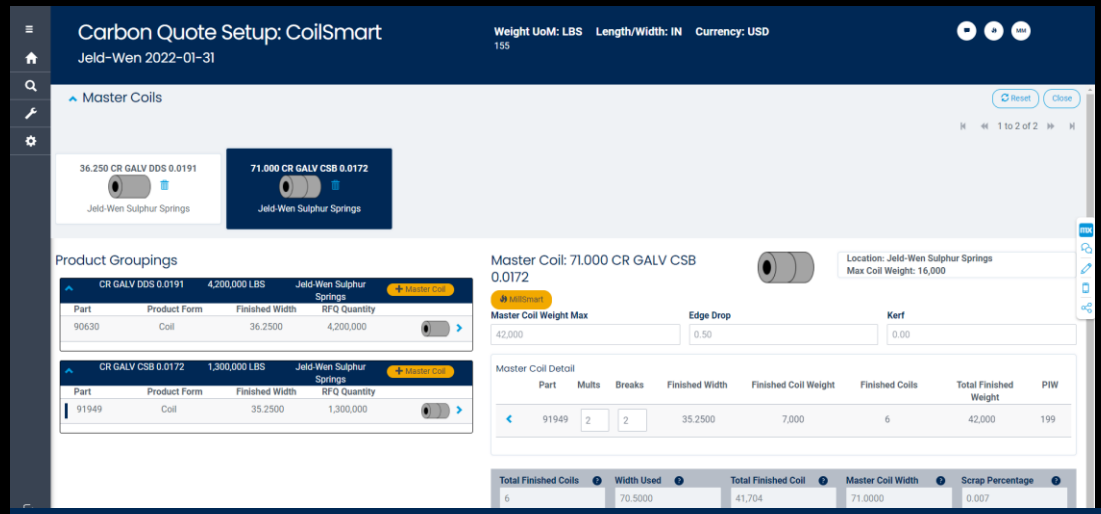


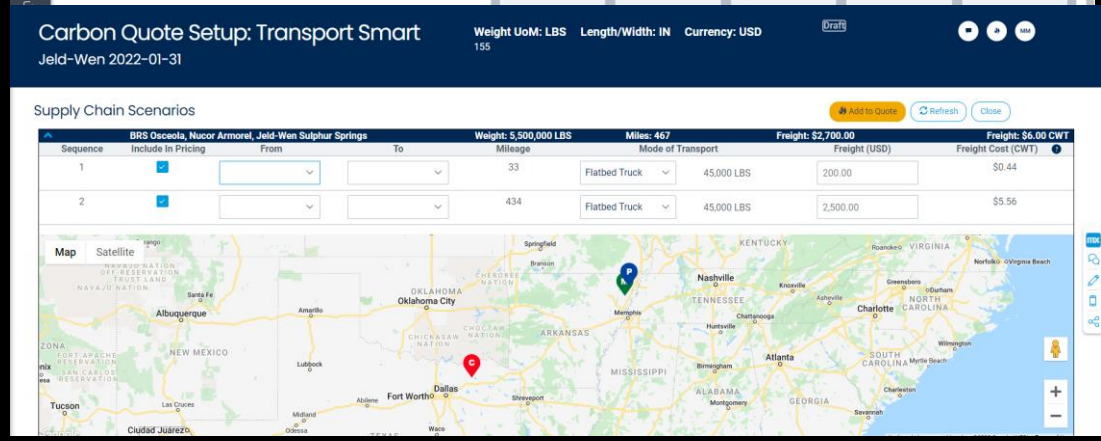


Configure, Price Quote - CPQ

- Replaced excel based quote process
- Standardized quoting process across the department for all product types
- Provided a common data structure for all quotes to allow for more accurate pricing
- Leveraged external pricing for market data
- Reduced the quote process from 2 weeks to 2 days







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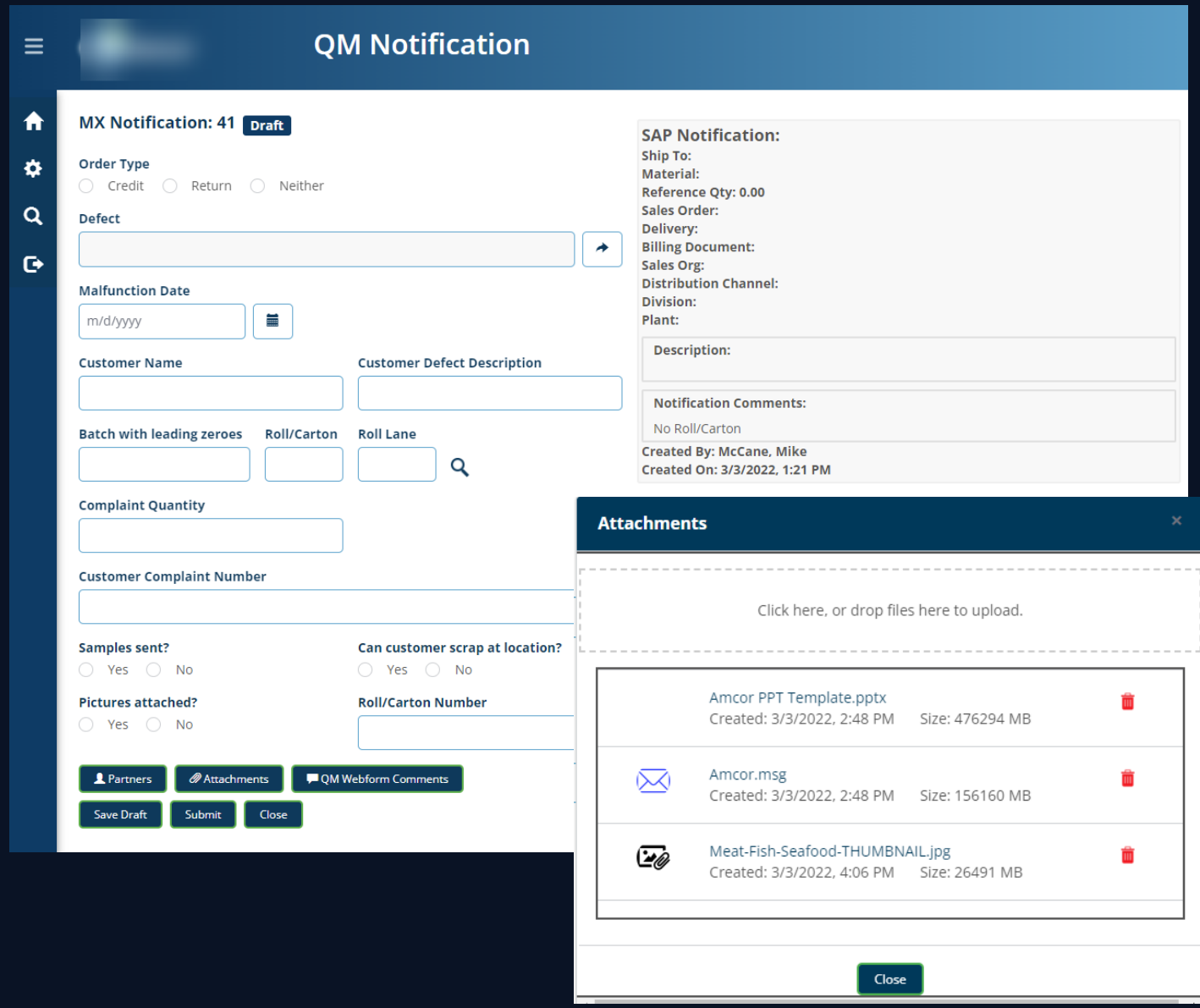
QM Notification Application

- Customer service application to create Quality Notifications
- Integrated with SAP QM
- Delivery Search by Batch, Roll, Lane
- One step to create an SAP QM, Sales Return, Credit Order and outbound letter
- Attach documents, emails and pictures to link with SAP
- Simplifies the QM creation process to a single screen simplifying data entry and reducing errors



Rapid AppWerks

Enterprise Asset Maintenance

Rapid AppWerks

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Rapid AppWerks

Rapid AppWerks

DJ

Maintenance Technician Cockpit

BATTLESHIP 2H | Search Work Order | Search Work Request | + Work Request | + Work Order | Refresh

Work Orders | Inspections

2 ASSIGNED

10 Light bulb is out Edit
Critical
4/18/2023, 9:21 AM
1044.6 hrs
8 Blowout Preventer

Operable
DJ Dan Jensen

11 Lightbulb is out Edit
Critical
4/20/2023, 11:18 AM
994.7 hrs
6 Mast

Operable
DJ Dan Jensen

1 STARTED

6 leaking water in lines Edit
Medium
3/3/2023, 5:38 PM
1849.9 hrs
8 Blowout Preventer

Operable
DJ Dan Jensen

0 COMPLETE

Feedback

Rapid AppWerks

Rapid AppWerks

JJ

Maintenance Supervisor Cockpit

BATTLESHIP 2H | machine is not working | Check the centrifuge

+ Work Request | + Work Order | + Inspection | Refresh

0 Equipment Alerts

Work Orders By Status | Inspections

1 UNASSIGNED

9 Mast Lightbulb Out Edit

Critical

4/17/2023, 8:29 PM
0 hrs
6 Mast

Operable

Assign

4 ASSIGNED

4 Check the centrifuge Edit

High

3/3/2023, 4:52 PM
2120.1 hrs
9 Centrifuge

Operable

MM Mike McCane

5 machine is not working Edit

High

3/3/2023, 5:17 PM
2139.3 hrs
11 Drill Bit

Operable

MM Mike McCane

10 Light bulb is out Edit

Critical

4/18/2023, 9:21 AM
1044.7 hrs
8 Blowout Preventer

Operable

1 STARTED

6 leaking water in lines Edit

Medium

3/3/2023, 5:38 PM
1849.9 hrs
8 Blowout Preventer

Operable

DJ Dan Jensen

0 COMPLETE

3 UNAPPROVED REQUESTS

23 Test Edit

Critical

8 Blowout Preventer

Operable

Requested Date: 4/11/2023

Requested By:

JS Joe Service

Approve | Reject

27 Exceeded temperature threshold of 82.00 F Edit

Critical

8 Blowout Preventer

Operable

Requested Date: 4/15/2023

Requested By:

MM Mike McCane

Approve | Reject

31 Lightbulb Edit

Feedback

Rapid AppWerks

Rapid AppWerks

JJ

Work Order: 11 Lightbulb is out Assigned

Progress: 2 of 3
67%

994.7 hrs
Open

Details | Technician Time | Work Procedures | Timeline

Complete Work Order

Work Request: 29 Lightbulb is out Critical

Equipment: 6 Mast
Type: Mast

Operable

Assigned To

Dan Jensen 4/20/2023, 11:18 AM

Work Order Type:
Unplanned

Start Time: m/d/yyyy, h:mm AM/PM

End Time: m/d/yyyy, h:mm AM/PM

Work Request Images
Work Request Notes

Open Time

▶ Start Time

No items found

Comments

+ Comment

Equipment Hierarchy

Feedback

Rapid AppWerks

Rapid AppWerks

JJ

Work Order: 11 Lightbulb is out

Assigned

Progress: 2 of 3

67%

994.7 hrs

Open

Details | Technician Time | Work Procedures | Timeline

Complete Work Order

1 Safety PP&E

	Description	Status	Completed Date
	All Safety and PPE available	Complete	4/20/2023, 11:29 AM

2 Replace Light Bulb

	Description	Status	Completed Date
	Remove old lighbulb	Complete	5/9/2023, 12:59 PM
	Add New lightbulb	Not Started	

Open Time

Start Time

No items found

Comments

+ Comment

Equipment Hiearchy

Equipment: 6 Mast
Type: Mast

Subequipment

- **2 Top Section**
  Type: Mast
- **3 Bottom Section**
  Type: Mast
- **4 Crown Block**
  Type: Mast
- **5 Traveling Block**
  Type: Mast
- **6 Reeved Drill Line**
  Type: Mast

Feedback

Rapid AppWerks

Work Order: 11 Lightbulb is out

994.7 hrs
Open

Details | Technician Time | Work Procedures | Timeline

1 Safety PP&E

	Description	Statu
	All Safety and PPE available	Com

2 Replace Light Bulb

	Description	Statu
	Remove old lighbulb	Com
	Add New lightbulb	Not

Start Time

+ Comment

Feedback

Work Procedure

1 All Safety and PPE available

Safety & PPE

1.00	Hard Hat

Tools

Parts

⚠ **Warning: Please make sure all Safety and PPE is available. Do not continue if not.**

(•) Yes ( ) No

Save | Complete | Close

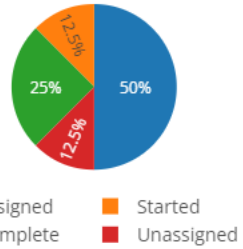
7 Packing Board

Rapid AppWerks

Rapid AppWerks

JJ

My Work Orders



6
Active Work Orders

1
Unassigned

4
Assigned

1
Started

0
Completed (last 30 days)

3
Work Order Requests

Work Orders | Work Requests | Locations

Number	Equipment	Type	Location	Description	Status	Start Date	End Date	Time to Repair
4	Centrifuge	Centrifuge	BATTLESHIP 2H	Check the centrifuge	Assigned			0
5	Drill Bit	Drill Bit	BATTLESHIP 2H	machine is not working	Assigned			0
6	Blowout Preventer	Blowout Preventer	BATTLESHIP 2H	leaking water in lines	Started	3/15/2023		0
7	Mast	Mast	BATTLESHIP 2H	Mast light bulb is out a...	Complete	3/6/2023	4/18/2023	61502.7662
8	Blowout Preventer	Blowout Preventer	BATTLESHIP 2H	Oil Indicator is Low	Complete	3/15/2023	3/16/2023	2734.0498
9	Mast	Mast	BATTLESHIP 2H	Mast Lightbulb Out	Unassigned			0

Feedback

Rapid AppWerks

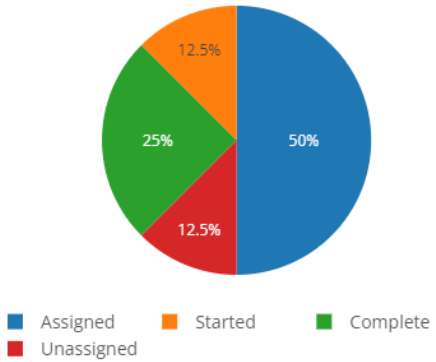
JJ

Maintenance Dashboard

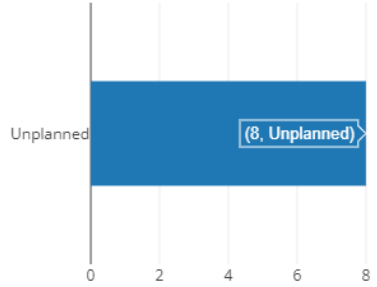
Last 7 Days | Go | Refresh | machine is not working | Check the centrifuge | + Work Request | + Work Order

Work Orders

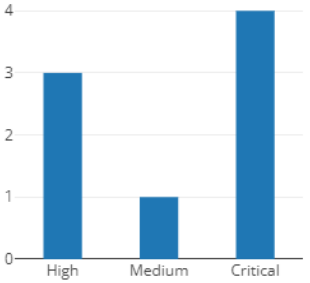
Work Orders by Status



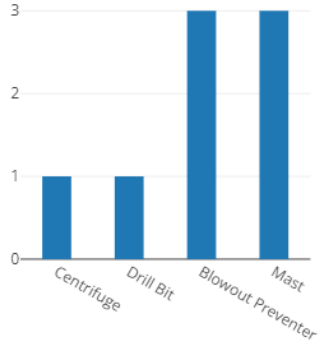
Work Orders by Type



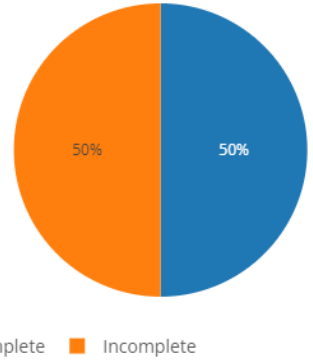
Work Orders by Priority



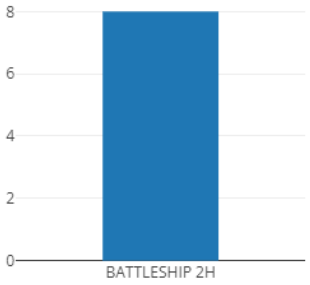
Work Orders by Equipment Type



Work Order Compliance



Top 10 Work Order Locations



Feedback

Feedback

Work Order Procedure 1: Change the Oil - Blowout Preventer

Description: Change the Oil

Equipment type: Blowout Preventer

Deleted: Yes / No

Procudure Groups

+ New

1 Safety Checklist
2 Remove Outer Housing
3 Fill oil up to the fill level indicator
4 Remove Gasket
5 Add New Gasket
6 Replace Outer Housing

Order: 4

Description: Remove Gasket

+ New Item

Procudure Items

	Description	Yes/No	Value (Number)	Date	Rating	Text
Edit	1 Using a flat head screwdriver scrap the gasket off of the flange	Yes	No	No	No	No
Edit	2 Dispose of old gasket in waste bin	Yes	No	No	No	No

Save Cancel

Feedback

Work Order Procedure 1: Change the Oil - Blowout Preventer

Description: Change the Oil

Equipment type: Blowout Preventer

Deleted: Yes / No

Procudure Groups

+ New

1 Safety Checklist
2 Remove Outer Housing
3 Fill oil up to the fill level indicator
4 Remove Gasket
5 Add New Gasket
6 Replace Outer Housing

Order: 4

Description: Remove Gasket

+ New Item

Procudure Items

	Description	Yes/No	Value (Number)	Date	Rating	Text
Edit	1 Using a flat head screwdriver scrap the gasket off of the flange	Yes	No	No	No	No
Edit	2 Dispose of old gasket in waste bin	Yes	No	No	No	No

Save Cancel

Feedback

Rapid AppWerks

Rapid AppWerks

Equipment: 3 Blowout Preventer

Operable

Transfer

Images

Latest Sensor Readings

Charts

Humidity	Temperature	Pressure
54.59	75.91	99.04
6/1/2023, 10:06 AM ID: Bobine	6/1/2023, 10:06 AM ID: Bobine	6/1/2023, 10:06 AM ID: Bobine

Sensor alert View

Temperature Exceeded Threshold

Bobine Temperature	Arduino Temperature
Sensor Data	Alert Setup
82.54 Temperature 4/15/2023, 5:22 PM ID: Bobine	>= 90.00

Acknowledged
Mike McCane
4/16/2023, 11:59 AM

+ Work Request

Alerts | Details | Sub equipment | Sensors

Alert Date	S	ype	Message	Acknowledged
4/15/2023, 5:22 PM		emperature	Temperature Exceeded Threshold	4/16/2023, 11:59 AM
4/15/2023, 5:56 PM	Bobine	82.20	Temperature	Temperature Exceeded Threshold
4/15/2023, 6:16 PM	Bobine	82.23	Temperature	Temperature Exceeded Threshold
4/15/2023, 6:17 PM	Bobine	82.30	Temperature	Temperature Exceeded Threshold
4/15/2023, 7:14 PM	Bobine	80.12	Temperature	Temperature Exceeded Threshold

Feedback

Rapid AppWerks

Rapid AppWerks

Equipment: 3 Blowout Preventer

Operable

Latest Sensor Readings

54.34	75.74	99.05
Humidity	Temperature	Pressure
6/1/2023 10:07:16 ID: Bobine	6/1/2023 10:08:07 ID: Bobine	6/1/2023 10:07:46 ID: Bobine

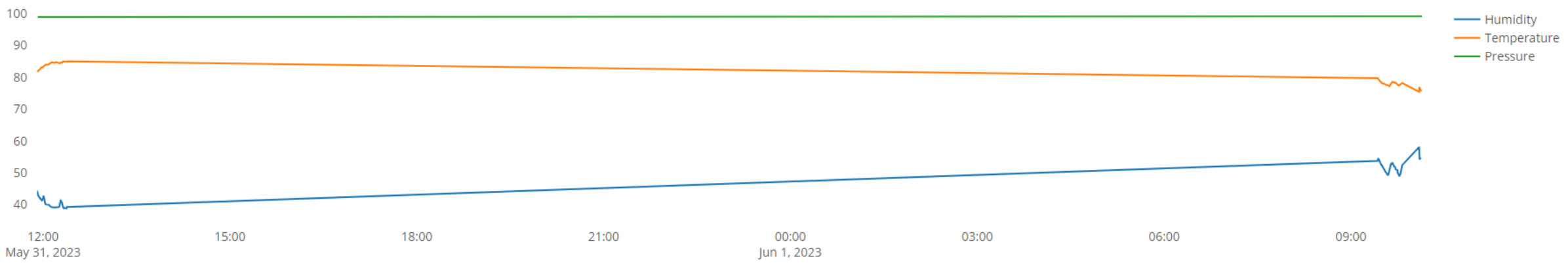
Date from 5/31/2023

Date to 6/2/2023

Refresh

Last Refresh: 6/01/2023 10:08:32

Feedback



Rapid AppWerks

Rapid AppWerks

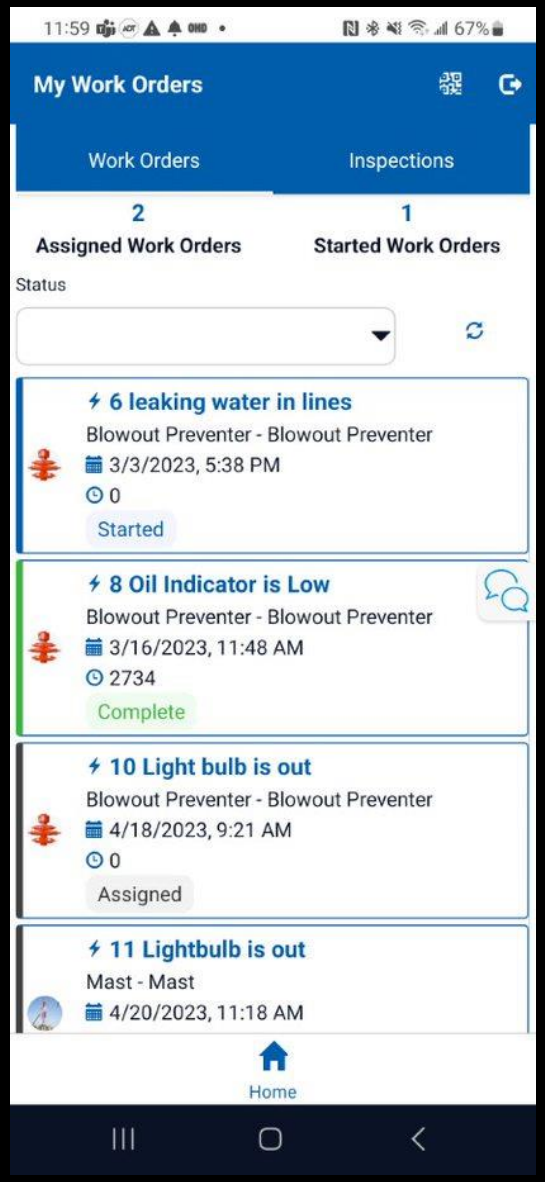
Device: 1 HydroConnect

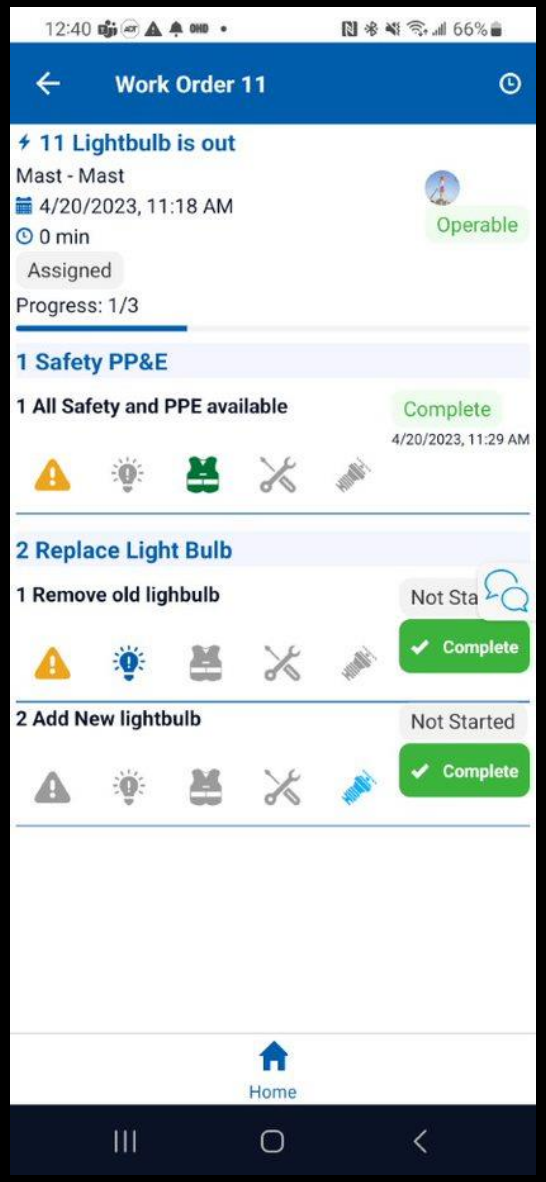
Device ID: e6df677e-82aa-458d-a0b7-49557cdadcea **Setup Status: Yes** **Connection Status**

Properties

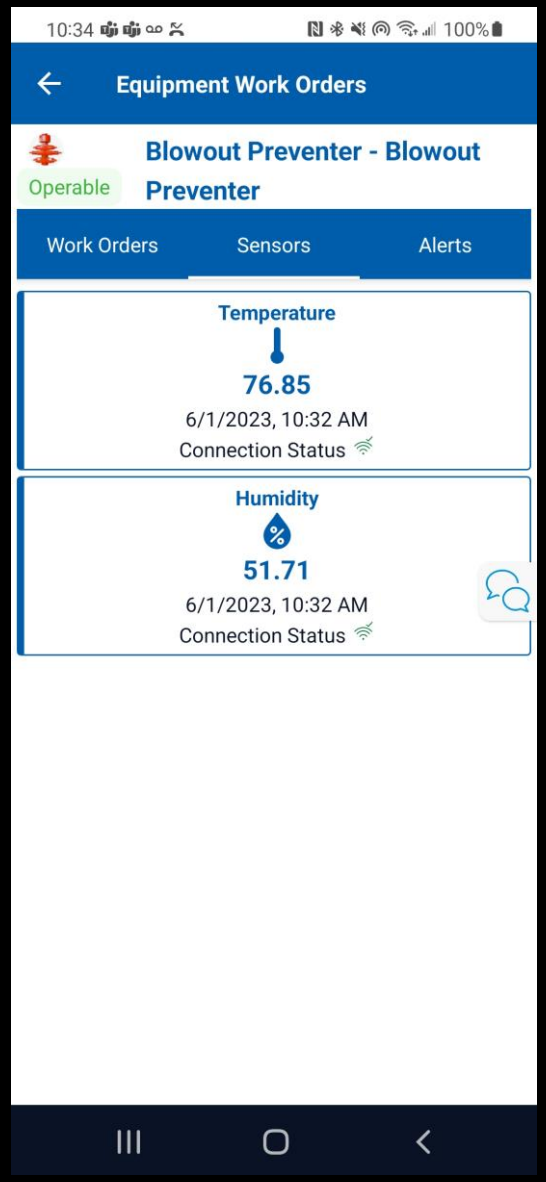
Humidity Created On: 5/11/2023, 7:25 PM Latest Update: 5/11/2023, 7:25 PM	READ_WRITE	ON_CHANGE ID: c037ad7e-e978-4d77-a5bd-4cee6fbd78f0	humidity	**52.87** Last Value 6/1/2023, 10:09 AM
Pressure Created On: 5/13/2023, 3:31 PM Latest Update: 5/13/2023, 3:31 PM	READ_WRITE	ON_CHANGE ID: 8a76ec86-6551-4bf0-8ff7-a159283e60c6	pressure	**99.04** Last Value 6/1/2023, 10:09 AM
Temperature Created On: 5/11/2023, 7:25 PM Latest Update: 5/11/2023, 7:25 PM	READ_WRITE	ON_CHANGE ID: 8da8787b-2645-4a23-af5c-16e534cc9575	temperature	**75.94** Last Value 6/1/2023, 10:08 AM

Feedback


My Work Orders
Work Orders
Inspections
2
Assigned Work Orders
1
Started Work Orders
Status
6 leaking water in lines
Blowout Preventer - Blowout Preventer
3/3/2023, 5:38 PM
0
Started
8 Oil Indicator is Low
Blowout Preventer - Blowout Preventer
3/16/2023, 11:48 AM
2734
Complete
10 Light bulb is out
Blowout Preventer - Blowout Preventer
4/18/2023, 9:21 AM
0
Assigned
11 Lightbulb is out
Mast - Mast
4/20/2023, 11:18 AM
Home

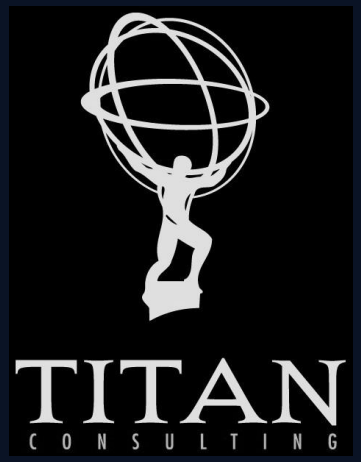

Work Order 11
11 Lightbulb is out
Mast - Mast
4/20/2023, 11:18 AM
0 min
Assigned
Progress: 1/3
Operable
1 Safety PP&E
1 All Safety and PPE available
Complete
4/20/2023, 11:29 AM
2 Replace Light Bulb
1 Remove old lighbulb
Not Sta
Complete
2 Add New lightbulb
Not Started
Complete
Home

Work order Scan equip...


Equipment Work Orders
Operable
Blowout Preventer - Blowout Preventer
Work Orders
Sensors
Alerts
Temperature
76.85
6/1/2023, 10:32 AM
Connection Status
Humidity
51.71
6/1/2023, 10:32 AM
Connection Status

mx mendix

Thank you!



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